



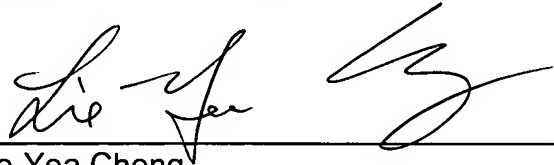
admission that any patent, publication, or other information referred to therein is prior art for this invention unless specifically designated as such.

In accordance with 37 CFR § 1.97, this Supplemental Information Disclosure Statement is not to be construed as a representation that a search has been made or that no other possibly material information as defined under 37 CFR § 1.56(a) exists.

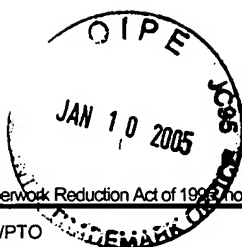
The patents and/or publications submitted herewith are set forth on the attached Form PTO-1449.

The Commissioner is hereby authorized to charge the sum of \$180.00 due under 37 CFR § 1.17(p) pursuant to § 1.97, and any other fee necessary to make this submission timely, to the Deposit Account No. 20-0782/AMAT/7989/LYC.

Respectfully submitted,

A handwritten signature in black ink, appearing to read 'Lie-Yea Cheng', is written over a horizontal line.

Lie-Yea Cheng  
Registration No. 52,732  
MOSER, PATTERSON & SHERIDAN, L.L.P.  
3040 Post Oak Blvd. Suite 1500  
Houston, TX 77056  
Telephone: (713) 623-4844  
Facsimile: (713) 623-4846  
Agent for Applicant(s)



Substitute for form 1449A/PTO

**SUPPLEMENTAL  
INFORMATION DISCLOSURE  
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)

Sheet 1 of 3

**Complete if Known**

Application Number	10/665,934
Filing Date	09/19/2003
First Named Inventor	Liu, et al.
Art Unit	2812
Examiner Name	Unassigned
Attorney Docket Number	7989/ETCH/SILICON/JB1

**U.S. PATENT DOCUMENTS**

Examiner Initials *	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number - Kind Code <sup>2</sup> (if known)			
		US- 6,762,130	07/13/2004	LAAKSONEN, ET AL.	
		US- 6,625,497	09/23/2003	FAIRBAIRN, ET AL.	
		US- 6,606,738	08/12/2003	BELL, ET AL.	
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		US- 2003/0092281	05/15/2003	RAMACHANDRAMURTHY, ET AL.	
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		US- 6,150,664 (Withdrawn)	11/21/2000	SU	
		US- 5,963,329	10/05/1999	CONRAD, ET AL.	
		US- 2002/0155629	10/24/2002	FAIRBAIRN, ET AL.	
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		US- 5,963,329	10/05/1999	CONRAD, ET AL.	

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Substitute for form 1449B/PTO  <b>SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  <i>(Use as many sheets as necessary)</i>				<b>Complete if Known</b>	
				Application Number	10/665,934
				Filing Date	09/19/2003
				First Named Inventor	Liu et al.
				Art Unit	2812
				Examiner Name	Unassigned
				Attorney Docket Number	7989/ETCH/SILICON/JB1
Sheet	2	of	3		

U.S. PATENT DOCUMENTS					
Examiner Initials *	Cite No. <sup>1</sup>	Document Number <small>Number - Kind Code<sup>2</sup> (if known)</small>	Publication Date <small>MM-DD-YYYY</small>	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		US- 5,944,940	08/31/1999	TOSHIMA	
		US- 5,926,690	07/20/1999	TOPRAC, ET AL.	
		US- 5,913,102	06/15/1999	YANG	
		US- 5,653,894	08/05/1997	IBBOTSEN, ET AL.	
		US- 5,452,521	09/26/1995	NIEWMIERZYCKI	
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		US- 4,447,731	05/08/1984	KUNI, ET AL.	

FOREIGN PATENT DOCUMENTS						
Examiner Initials *	Cite No. <sup>1</sup>	Foreign Patent Document  <small>Country Code<sup>3</sup> - Number<sup>4</sup> - Kind Code<sup>5</sup> (if known)</small>	Publication Date <small>MM-DD-YYYY</small>	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	
		WO 01/09934 A1	02/08/2001	Williams, et al.		
		WO 02/37186 A1	05/10/2002	Brill, et al.		
		WO 03/003447 A2	01/09/2003	Rangarajan, et al.		
		EP 1 083 424	03/14/2001	Hunter, et al.		
		EP 1 079 428	02/28/2001	Adams, et al.		
		WO 02/09170 A2	01/31/2002	Drake, et al.		
		WO 01/84382 A1	11/08/2001	Lakkapragada, et al.		
		EP 0 727 715	08/12/1996	AT&T Corp.		
		JP 61 290312	12/20/1986	Hitachi Ltd.		

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials *	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T <sup>2</sup>
		YANG, ET AL., "Line-Profile and Critical Dimension Measurements Using a Normal Incidence Optical Metrology System," Proceedings of SPIE Vol. 4689, March 2002.	
		KOTA, ET AL., "Advanced Process Control for Polysilicon Gate Etching Using Integrated Optical CD Metrology", Proceedings of SPIE, Vol. 5044 (2003) pp. 90-96.	
Examiner Signature			Date Considered

\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

<sup>1</sup> Applicant's unique citation designation number (optional). <sup>2</sup> Applicant is to place a check mark here if English language Translation is attached.

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Substitute for form 1449B/PTO		<b>Complete if Known</b>	
<b>SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  (Use as many sheets as necessary)		Application Number	10/665,934
		Filing Date	09/19/2003
		First Named Inventor	Liu et al.
		Art Unit	2812
		Examiner Name	Unassigned
		Attorney Docket Number	7989/ETCH/SILICON/JB1
Sheet	3	of	3

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials *	Cite No. 1	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T <sup>2</sup>
		Anthony J. Toprac, "AMD's Advanced Process Control of Poly-gate Critical Dimension", SPIE Conference on Process, Equipment and Materials Control in Integrated Circuit Manufacturing, September 1999, Santa Clara, CA. SPIE, Vol. 3882	
		Lee, M.E., "Analysis of Reflectometry and Ellipsometry Data from Patterned Structures", Characterization and Metrology for ULSI Technology: 1998 International Conference, ed. D.G. Seiler, et al., 1998, pp. 331-335.	
		McIntosh, J.M., et al., "Approach to CD SEM Metrology Utilizing the Full Waveform Signal", Proceedings of the SPIE, vol. 3332, pp. 51-60, February 23, 1998	
		Ausschnit, Christopher P., et al., "Seeing the Forest for the Trees: A New Approach to CD Control," Ed. Bhanwar Singh, Proceeding of the SPIE, vol. 3332, pp. 212-220, February 23-25, 1998.	
		Moharam, M.G., et al., "Stable Implementation of the Rigorous Coupled-Wave Analysis for Surface-Relief Gratings: Enhanced Transmittance Matrix Approach," Journal of the Optical Society of America, vol. 12, no. 5, pp. 1077-1086, May 1995	
		Chateau, Nicolas, "Algorithm for the Rigorous Coupled-Wave Analysis of Grating Diffusion," Journal of the Optical Society of America, vol. 11, no. 4, pp 1321-1331, April 1994	
		G.P. Kotta, et al., "Integrated CD Metrolog for Poly Si Etching", Lam Research Corporation, Plasma Etch Users Group Meeting, January 17, 2002.	
		Raymond, Christopher J., "Angle-Resolved Scatterometry of Semiconductor Manufacturing", Microlithography World, Winter 2000, pp. 18-23	

Examiner Signature		Date Considered	
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